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CLAIMS

1. A process for obtaining 17 α -acetoxy-11 β -(4-N,N-dimethylaminophenyl)-19-norpregna-4,9(10)-diene-3,20-dione [VA-
5 2914] comprising:

- a) forming VA-2914 isopropanol hemisolvate crystals by means of crystallizing VA-2914 in isopropanol;
- 10 b) separating the VA-2914 isopropanol hemisolvate crystals; and
- c) converting VA-2914 isopropanol hemisolvate into VA-2914.

15 2. A process according to claim 1, wherein formation of VA-2914 isopropanol hemisolvate crystals comprises dissolving VA-2914 in isopropanol under heat, and subsequent cooling of the resulting solution, optionally under stirring.

20 3. A process according to claim 2, wherein the VA-2914 and isopropanol mixture is heated at a temperature comprised between 75°C and the solvent reflux temperature, until complete dissolution of VA-2914, and subsequently, the resulting solution of VA-2914 in isopropanol is allowed to cool at a temperature
25 comprised between 0°C and 30°C.

4. A process according to claim 1, wherein the VA-2914 isopropanol hemisolvate crystals are separated by filtration.

30 5. A process according to claim 1, wherein conversion of VA-2914 isopropanol hemisolvate into VA-2914 is carried out by recrystallization in a solvent.

35 6. A process according to claim 5, wherein conversion of VA-2914 isopropanol hemisolvate into VA-2914 is carried out by recrystallization in a solvent chosen between ethanol/water and ethyl ether.

7. A process according to claim 1, wherein said VA-2914 compound is obtained by acid hydrolysis of compound 3,3-(1,2-ethanedioxy)-5 α -hydroxy-11 β -(4-N,N-dimethylaminophenyl)-17 α -
5 acetoxy-19-norpregna-9-ene-20-one [carbinol acetate].

8. A process for purifying 17 α -acetoxy-11 β -(4-N,N-dimethylaminophenyl)-19-norpregna-4,9-diene-3,20-dione (VA-2914) comprising recrystallizing raw VA-2914 in isopropanol and
10 forming VA-2914 isopropanol hemisolvate.

9. 17 α -acetoxy-11 β -(4-N,N-dimethylaminophenyl)-19-norpregna-4,9-diene-3,20-dione (VA-2914) isopropanol hemisolvate, characterised in that:

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it shows a potassium bromide pellet IR spectrum substantially similar to that shown in Figure 1, having significant bands at 1684, 1660, 1609, 1595, 1560, 1543, 1513, 1476, 1458, 1438, 1394, 1364, 1353, 1317, 1303, 1260,
20 1235, 1214, 1201, 1168, 1137, 1089, 1076, 1063, 1042, 1015, 965, 949, 922, 863, 830, 822, 795, 771, 734, 699, 668, 642, 617, 608, 592, 574, 537, 495 and 467 cm⁻¹;

the exotherm by differential scanning calorimetry (DSC)
25 shows a peak at about 156°C; and

it shows an X-ray diffractogram (powder) substantially similar to that shown in Figure 3, with characteristic peaks at 8.860, 9.085 and 16.375 degrees 2 theta (2 θ).

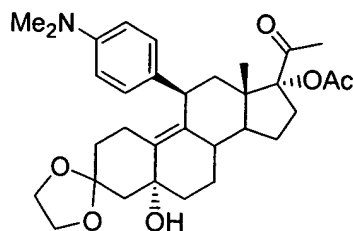
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10. A process for obtaining 17 α -acetoxy-11 β -(4-N,N-dimethylaminophenyl)-19-norpregna-4,9-diene-3,20-dione (VA-2914) isopropanol hemisolvate according to claim 9, comprising dissolving VA-2914 in isopropanol under heat and allowing the
35 resulting solution to cool to a temperature comprised between 0°C and 30°C.

11. Use of 17 α -acetoxy-11 β -(4-N,N-dimethylaminophenyl)-19-norpregna-4,9-diene-3,20-dione (VA-2914) isopropanol hemisolvate, as claimed in claim 9, as an intermediate in obtaining VA-2914 or in purifying raw VA-2914.

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12. The compound 3,3-(1,2-ethanedioxy)-5 α -hydroxy-11 β -(4-N,N-dimethylamino-phenyl)-17 α -acetoxy-19-norpregna-9-ene-20-one [carbinol acetate], of the formula:



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